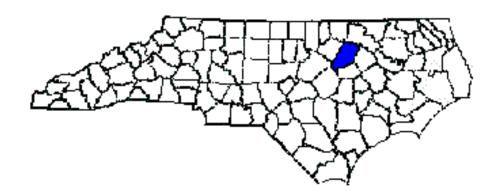
## **ANNUAL REPORT FOR 2010**



Pig Basket Creek Mitigation Site Nash County TIP No. B-3876



Prepared By:
Natural Environment Unit & Roadside Environmental Unit
North Carolina Department of Transportation
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### SUMMARY

The Pig Basket Creek Mitigation Site is located in Nash County. The site was planted in December 2008 and was designed as mitigation for wetland impacts associated with bridge project B-3876.

The mitigation encompasses approximately 0.52 acres of wetland restoration, including 0.22 acres at Site 4 and 0.30 acres at Site 5. The roadway project will impact 0.13 acres of unavoidable wetlands, leaving approximately 0.39 acres of wetland restoration assets onsite. The restoration will involve removing causeway fill from the existing approaches to Bridge No. 34 to match the adjacent wetland elevation. NCDOT will also perform enhancement along 90 feet of stream channel at Site 3 on the UT to Pig Basket Creek by removing existing fill as described above along its right bank and restricting agricultural activities along its left bank. NCDOT shall monitor vegetation success by visual observation and photo documentation and will submit an annual report. NCDOT shall monitor the site for a minimum of three years or until the site is deemed successful.

After the second year of monitoring, the Pig Basket Creek Site shows by visual observation that the planted species are surviving. Vehicular trespass for fishing access noted last year has stopped since NCDOT installed wetland signs along the perimeter.

NCDOT proposes to continue vegetation monitoring at the Pig Basket Creek Mitigation Site.

### 1.0 INTRODUCTION

### 1.1 Project Description

The Pig Basket Creek Mitigation Site is located at Bridge No. 34 on SR 1004 over Pig Basket Creek in Nash County (Figure 1). The site consists of approximately 0.52 acres of mitigation for wetland impacts and 90 feet of stream enhancement associated with project B-3876.

### 1.2 Purpose

In order for a mitigation site to be considered successful, a site must meet vegetation success criteria. This report details the vegetation monitoring in 2010 at the Pig Basket Creek Mitigation Site. Hydrologic monitoring was not required for the site.

### 1.3 Project History

December 2008

July 2009

Summer 2009

February 2010

June 2010

Reforestation Completed

Vegetation Monitoring (Year 1)

Site 4 was mowed

Replanted Site 4 Wetland Restoration Area

Vegetation Monitoring (Year 2)

### 1.4 Debit Ledger

Site name	Site TIP	HUC	River Basin	Division	County	Mitigation Type	Notes	As Built Quantity	Available	Debit
Pig Basket Creek	B-3876	3020101	Tar- Pamlico	4	Nash					B-3876
Orden	2 00:0	0020101				Riverine Wetland Restoration		0.52	0.39	0.13
						Stream Enhancement		90	0	90

Note: Debit ledger information up to date as of September 28, 2010.

# 2.0 VEGETATION: PIG BASKET CREEK MITIGATION SITE (YEAR 2 MONITORING)

### 2.1 Success Criteria

Success Criteria states that NCDOT shall monitor the mitigation site by visual observation and photo points for survival and aerial cover of vegetation. NCDOT shall monitor the site for a minimum of three years or until the site is deemed successful. Monitoring will be initiated upon completion of the site planting.

### 2.2 Description of Species

The following wetland species were planted in the Wetland Restoration Area:

Liriodendron tulipifera, Tulip Poplar

Platanus occidentalis, Sycamore

Fraxinus pennsylvanica, Green Ash

Quercus nigra, Water Oak

Quercus phellos, Willow Oak

Nyssa aquatica, Water Tupelo

The following wetland species were planted in the Stream Enhancement Area:

Salix nigra, Black Willow

### 2.3 Results of Vegetation Monitoring

The impacted area where the old bridge and causeway was removed is re-attaining wetland jurisdictional status and the planted species are surviving. Planted species noted surviving included sycamore, water oak, tulip poplar, green ash, water tupelo, and willow oak. Other species noted within the planted area included goldenrod, fennel, *Juncus* sp., ragweed, river birch, sedge, and various grasses. The vehicular trespassing noted last year has stopped since NCDOT installed the wetland signs along the perimeter. Vegetation noted within the stream enhancement area included black willow, red maple, black berry, pokeweed, tag alder, and various herbaceous species.

#### 2.4 Conclusions

There were approximately 0.52 acres of wetland restoration and 90 feet of stream enhancement planted on site. There were no plots established on the site. By visual observation, the Pig Basket Creek Mitigation Site shows that the planted species are surviving and the impacted area is re-attaining wetland jurisdictional status.

### 3.0 OVERALL CONCLUSIONS AND RECOMMENDATIONS

NCDOT proposes to continue vegetation monitoring at the Pig Basket Creek Mitigation Site.

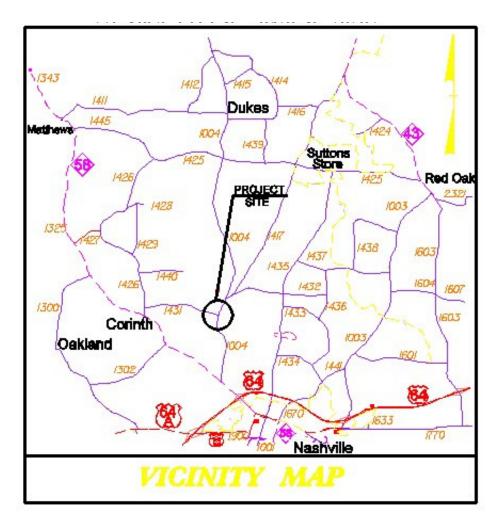


Figure 1. Site Location Map

# APPENDIX A SITE PHOTOS

# Pig Basket Creek



Photo 1 (Wetland Restoration-Site 4)



Photo 3 (Wetland Restoration-Site 5)

June 2010



Photo 2 (Wetland Restoration-Site 5)



Photo 4 (Stream Enhancement-Site 3)

